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UNITED STATES DISTRICT COURT

CENTRAL DISTRICT OF CALIFORNIA

SOUTHERN DIVISION

POLARIS POWERLED TECHNOLOGIES, LLC

Plaintiff,

v.

VIZIO, INC.

Defendant.

Case No. 8:18-cv-01571-JVS-DFM

DEFENDANT VIZIO, INC.'S RESPONSIVE SUPPLEMENTAL CLAIM CONSTRUCTION BRIEF REGARDING "CONFIGURED TO" TERMS

Polaris's proposed construction attempts to broaden the meaning of "first input configured to" and "second input configured to," to include implementations in either hardware or software, without intrinsic support. Polaris seeks to use the claim construction process as an opportunity to broaden the scope of the claim in a manner inconsistent with the intrinsic evidence and entirely separated from the context in which those terms are disclosed. For the term "multiplier configured to" which is not at issue here, the patent specification expressly and precisely states that the multiplier was able to perform certain actions via "hardware or software." *See, e.g.*, Ex. A ('117 patent) at 5:37-38 ("The multiplier circuit 106 ***can be implemented using software algorithm or using analog/mixed-signal circuitry***.") (emphasis added). For the two terms at issue here, however, the patent specification did not use this same precision, and in fact expressly omits that the "first input" and "second input" were capable of performing their functionality in either "hardware or software."

It is not a mistake or accidental omission that the patent specification lacks support for a software implementation of the "first input" or "second input." The specification describes hardware—not software—implementations to provide the function of the "first input" and "second input" at length; it describes arrangements of resistors, diodes, buffer circuits, clamps, semiconductor switches, and amplifiers to achieve the claimed functions for the "first input" and the "second input." *See, e.g.*, Ex. A at 2:54-4:4; 6:33-7:2; Figs. 1, 2, 4-6, 8, 9. The specification does not however disclose corresponding software implementations for the "first input" or "second input."

First, Polaris's attempt to broaden its claims by adding software functionality lacks intrinsic support, and would run afoul of the enablement and written description standards set forth by 35 U.S.C. §112. *See Wang Labs., Inc. v. Am. Online, Inc.*, 197 F.3d 1377, 1382–83 (Fed. Cir. 1999) (rejecting patentee's proposed construction because "although [it] is correct that a claim is not invalid

simply because it embraces subject matter that is not specifically illustrated, in order to be covered by the claims that subject matter must be sufficiently described as the applicant's invention to meet the requirements of section 112."); *Genentech, Inc. v. Novo Nordisk A/S*, 108 F.3d 1361, 1365 (Fed. Cir. 1997) ("To be enabling, the specification of a patent must teach those skilled in the art how to make and use the full scope of the claimed invention without 'undue experimentation.'") (quoting *In re Wright*, 999 F.2d 1557, 1561 (Fed. Cir. 1993)); *In re Fisher*, 427 F.2d 833, 839 (1970) ("[T]he scope of the claims must bear a reasonable correlation to the scope of enablement provided by the specification to persons of ordinary skill in the art."). Polaris does not explain at all how its proposed construction could be applied to these specific limitations in a way that would be supported by the specification or enabled.

Second, Polaris's contention that "[i]t was well-known in the art at the time of the '117 patent filing that a 'digital word' is part of the compiled software running on a processor" is inapposite. While Polaris "cherry-picks" certain unrelated patents and submits an expert declaration, other extrinsic evidence not cited by Polaris refers to a "digital word" specifically in the hardware context, such as applied to digital-to-analog converters. *See, e.g.*, Ex. B (U.S. Patent No. 4,539,553) at 1:14-22 ("In known digital-to-analog converters of the current-adding kind specifically intended to convert a binary-coded digital signal to an analog signal, ***when the number of bits in the input binary word is increased, the number of elements in the digital-to-analog converter*** must be greatly increased."); Ex. C (U.S. Patent No. 6,522,277) at 2:11-15 ("For example, a multi-bit quantizer can use a high-speed flash converter that assigns one comparator for each possible level. ***The comparator outputs are encoded into an appropriate binary word representative of a multi-bit digital signal***. Thus, instead of having a one-bit output, a multi-bit quantizer produces numerous bits forwarded in parallel across corresponding conductors of a multi-conductor bus.") (emphases added).

Polaris's reliance on the patent specification is similarly unavailing. For example, Polaris points to instances where the specification (and dependent claim 12) equate a user preference with a "digital signal," "binary word," or "digital word." Polaris Supp. Br. at 3-4. But this language in the abstract does not support Polaris's construction that the "first input" can be "implemented in software" to receive a user signal. As discussed above, a digital signal can be simply converted to analog in hardware by, *e.g.*, a digital-to-analog converter.

Polaris also points to Figure 9, arguing that the presence of a binary user input means the first input must be implemented software. *See* Polaris Supp. Br. at 4-5. But again, the mere presence of a binary input does not require software, as the digital-to-analog converter ("DAC") in Figure 9 converts the digital signal to analog using hardware components. Indeed, it was well-known at the time of the '117 patent filing that using a "binary input signal" with a DAC was a hardware concept—not a software one. *See*, *e.g.*, Ex. D (U.S. Patent No. 3,668,562) at Abstract ("The frequency selecting ***circuit is operated by a binary input signal*** and controls the frequency of the ***output signal produced by the digital to analog converter***."); Ex. E (U.S. Patent No. 3,474,440) at 1:15-20 ("There are n differential amplifiers, one for each bit of the digital input signal, cascaded to divide the constant current I into the binary components I/ 1, I/ 2, I 3, etc. ***These current components are then selected by the diode switches, which are energized by the binary input signal***."); Ex. F (U.S. Patent No. 3,588,882) ("***As the binary number input signal increases, the operation of the circuit of FIG. 1*** is repeated for each repetition of an increase of 3l (LSB) in the binary input signal. The largest error that will result will be an eight least significant digit error. If ***conventional digital-to-analog converter techniques*** are used, larger errors could result.") (emphases added).

Polaris is asking this Court to construe "configured to" with essentially no bounds. That is not consistent with the law. *Phillips v. AWH Corp.*, 415 F.3d 1303,

1318-19 (Fed. Cir. 2005) ("[T]here is a virtually unbounded universe of potential extrinsic evidence of some marginal relevance that could be brought to bear on any claim construction question . . ."). Rather, the Court should construe the term "first input configured to" in accordance with its plain and ordinary meaning. The Federal Circuit has long held that "claim terms take on their ordinary and accustomed meanings unless the patentee demonstrated an intent to deviate from the ordinary and accustomed meaning of a claim term by redefining the term or by characterizing the invention in the intrinsic record using words or expressions of manifest exclusion or restriction, representing a clear disavowal of claim scope." *Teleflex, Inc. v. Ficosa N. Am. Corp.*, 299 F.3d 1313, 1324 (Fed. Cir. 2002). No such intent has been shown here.

Similarly, a "second input configured to receive a selection signal to selectively operate the brightness control circuit in an auto mode or a manual model" should be also construed based on its plain and ordinary meaning. Polaris argues that this phrase should expressly entail hardware or software implementations because the specification purportedly equates this phrase to an "enable signal," which Polaris contends would "encompass both hardware and software signals." Polaris Supp. Br. at 6-7. But Polaris again stretches the bounds of the specification and ignores the plain language of the claim, which merely recites that the user selects an "auto mode" or a "manual mode." Making a selection between one of two operating modes requires nothing more than a binary selection, not implementation in software.

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Respectfully submitted,

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